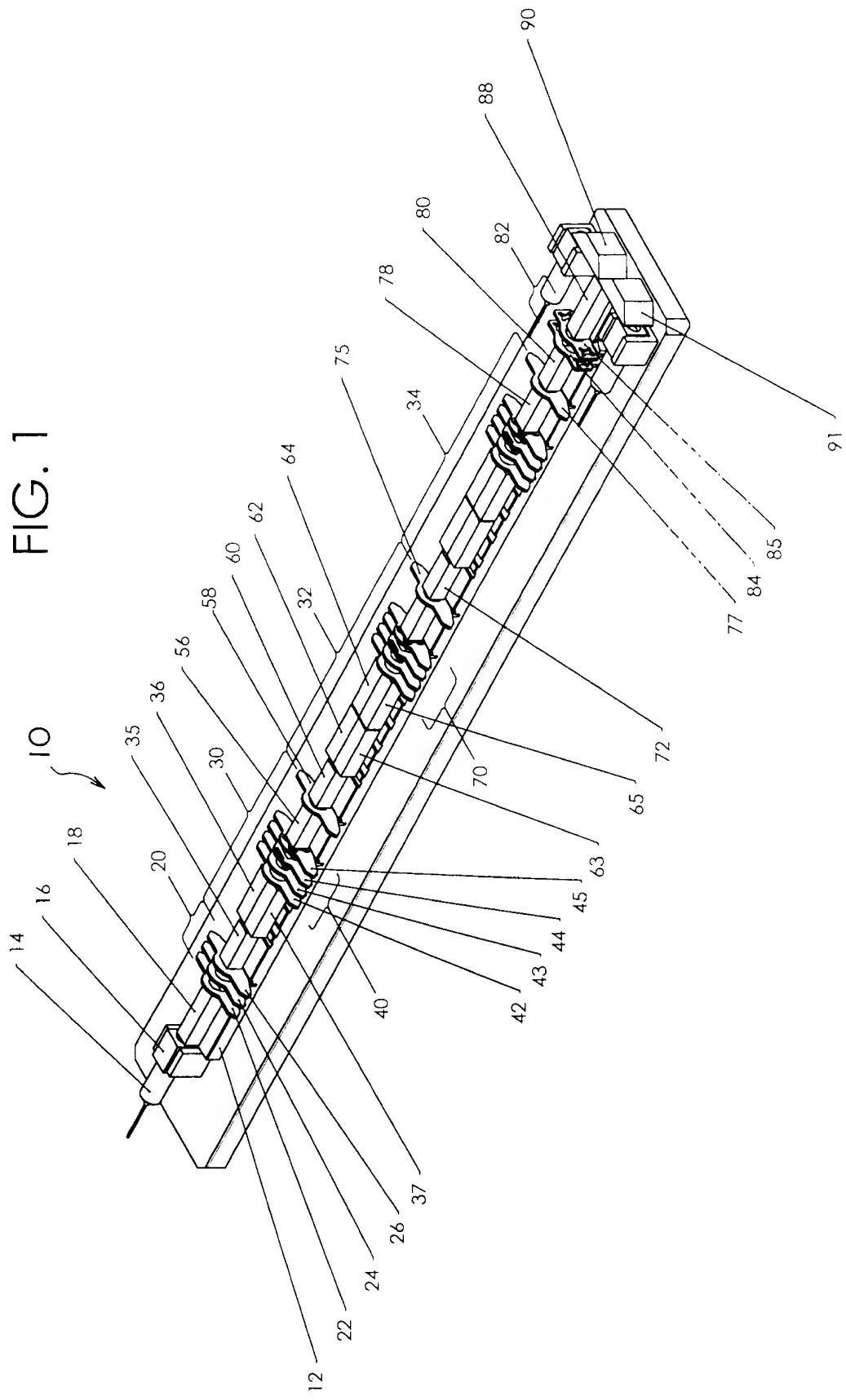


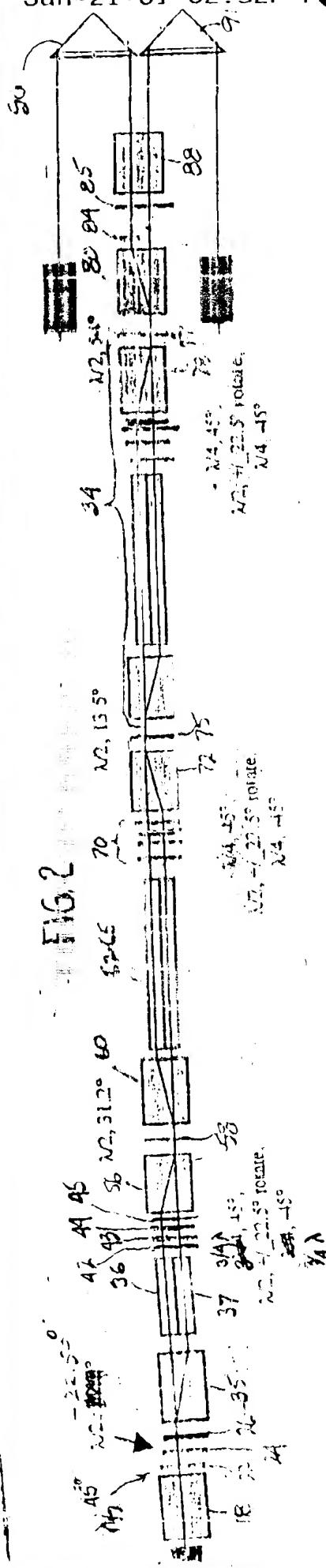
FIG. 1



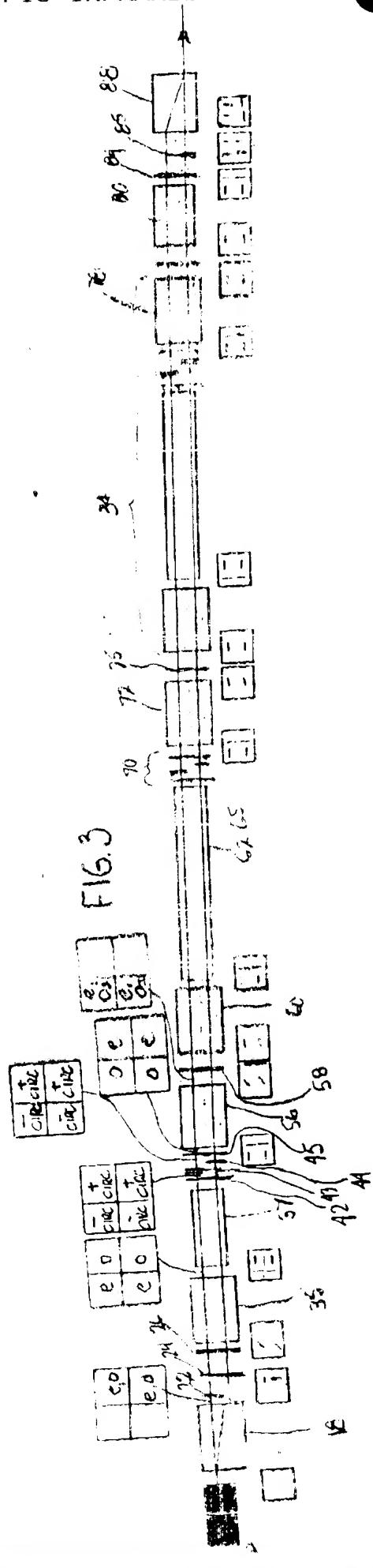
JUN-21-01 02:32P HAFIC INFRARED

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P. C.



162



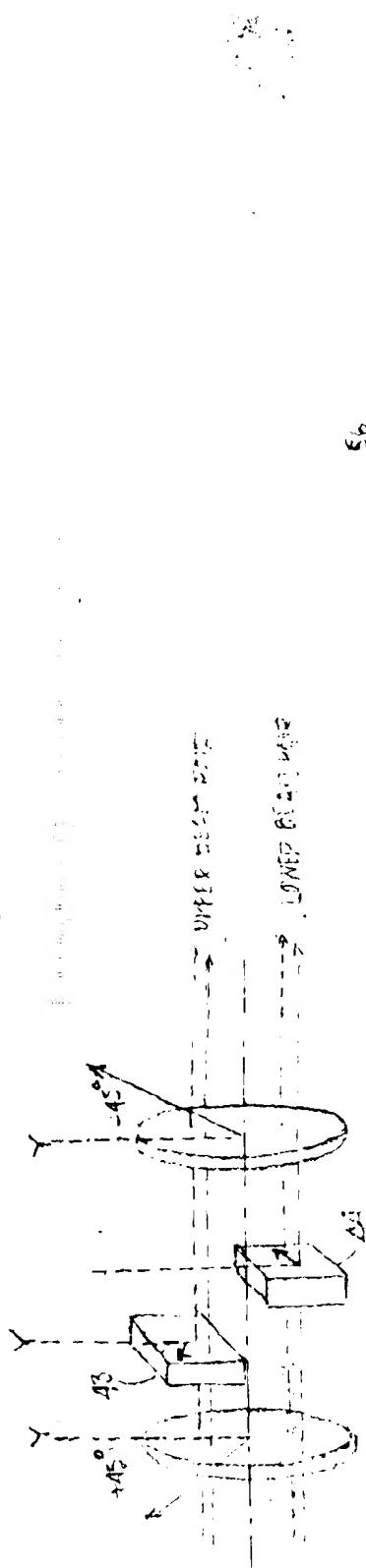


FIG. 5

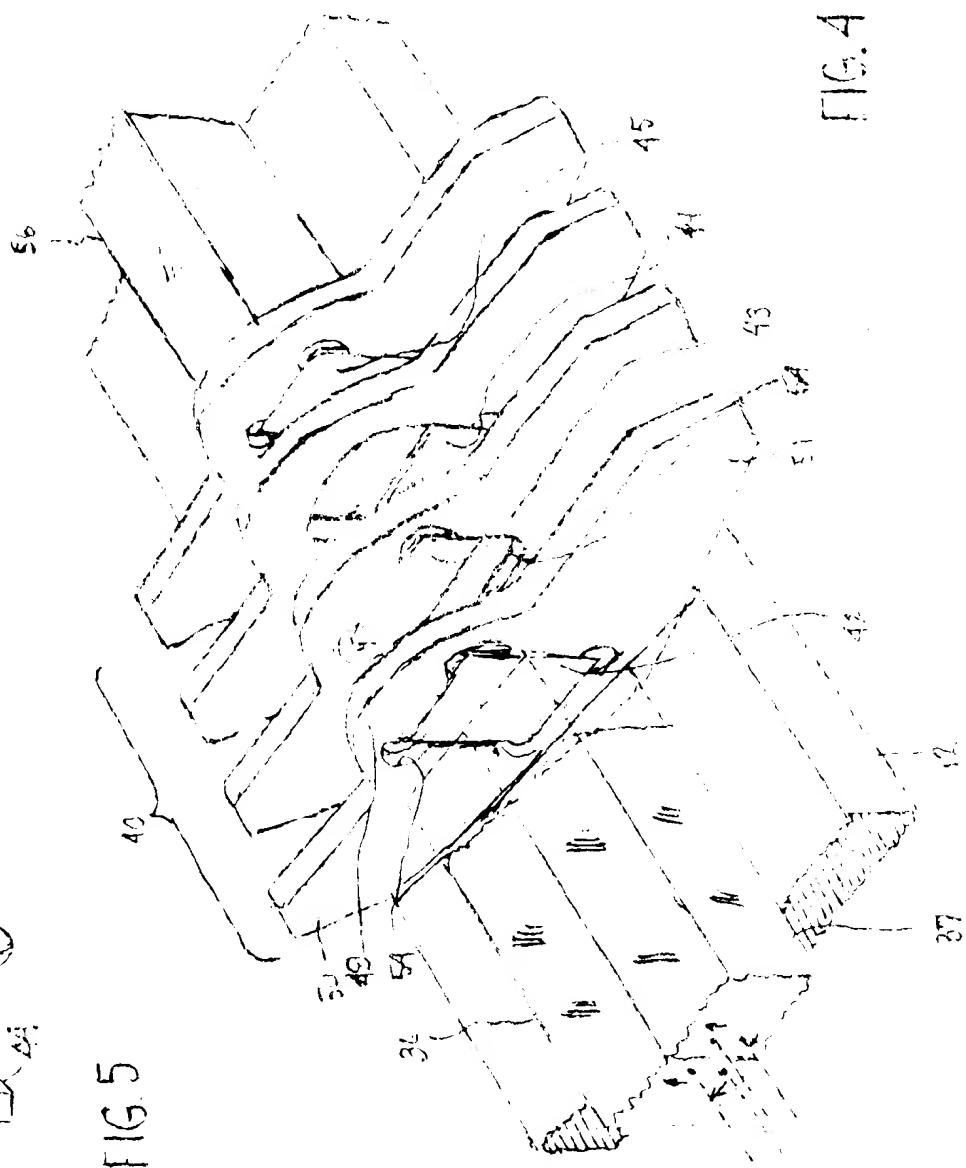


FIG. 4

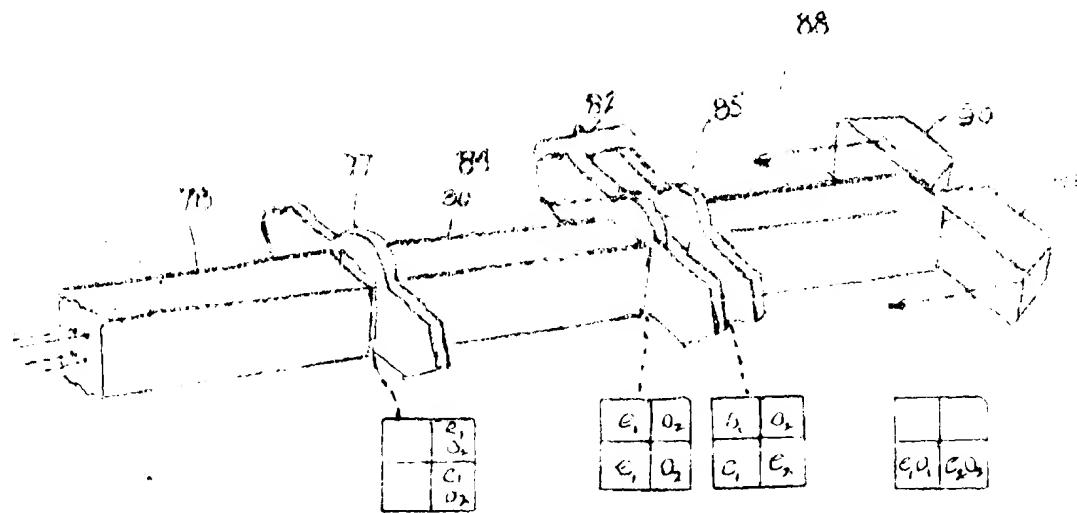
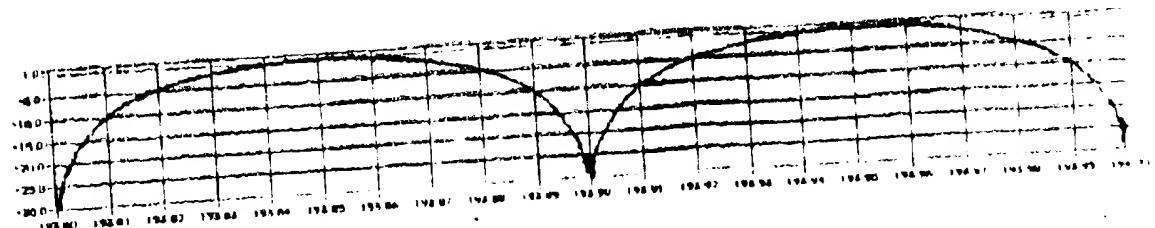
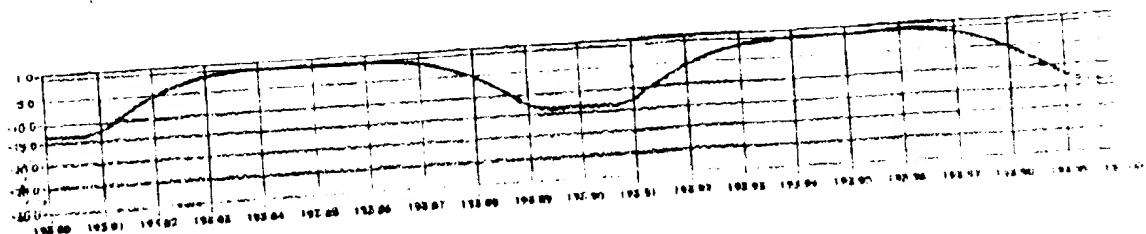


FIG. 6

stage 1: channel separation



stage 2: passband flattening



stage 3: crosstalk reduction

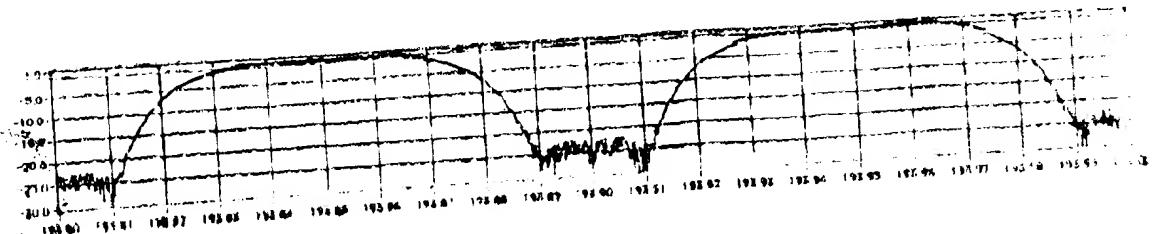


Figure 7 Effect of multiple stages on interleaver transmission characteristics

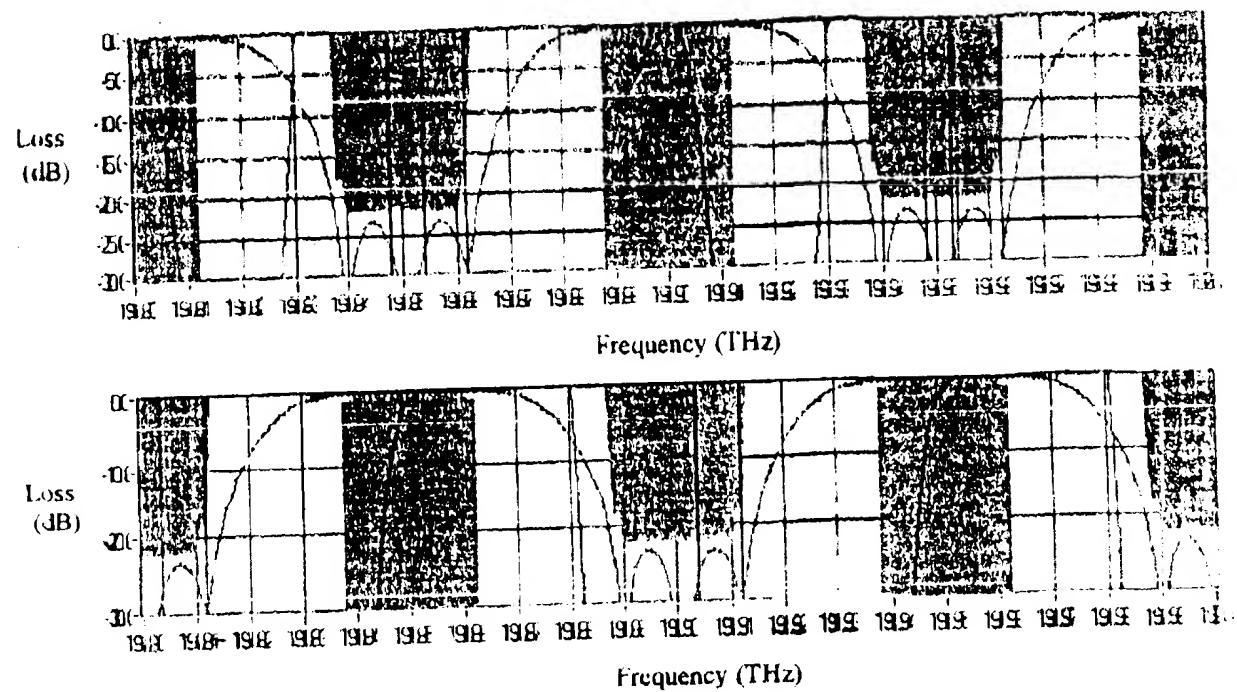


Figure 8 Optical response of a three stage 50 GHz interleaver

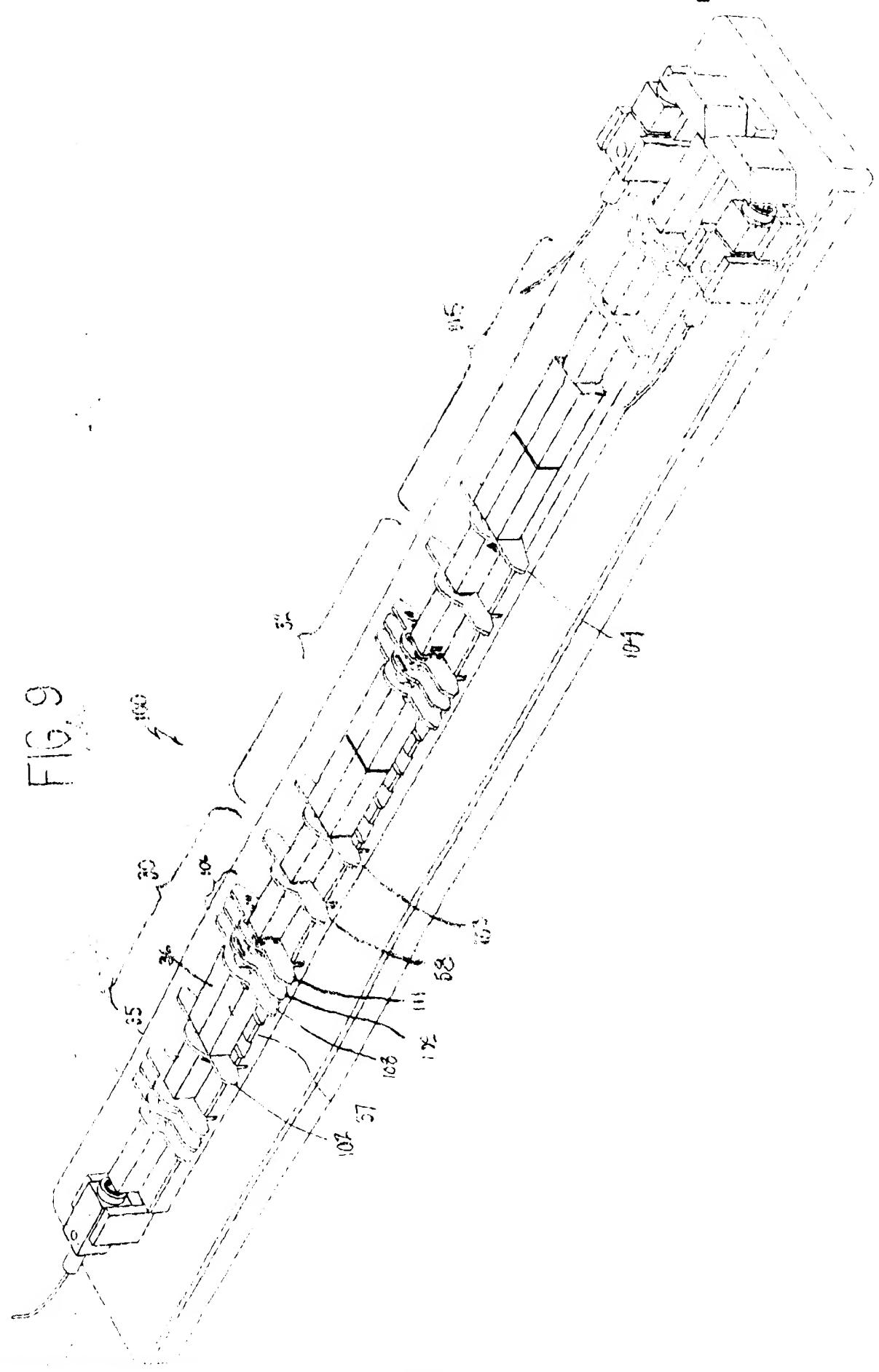
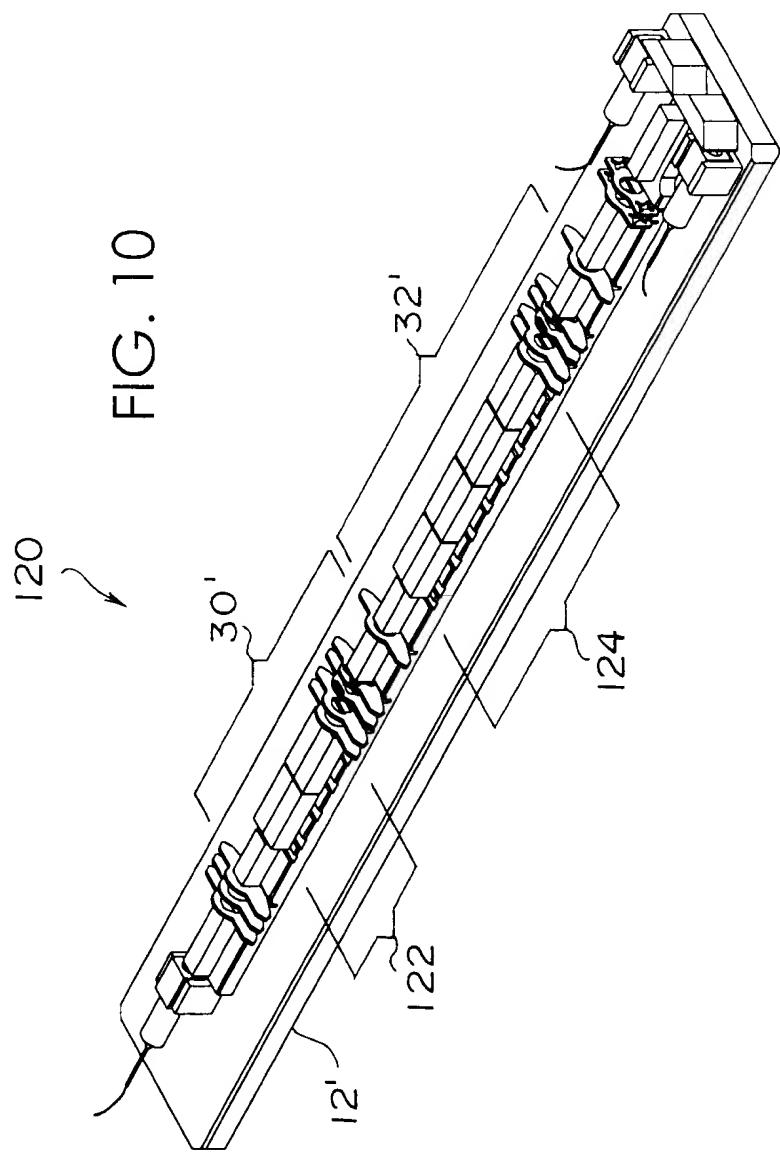
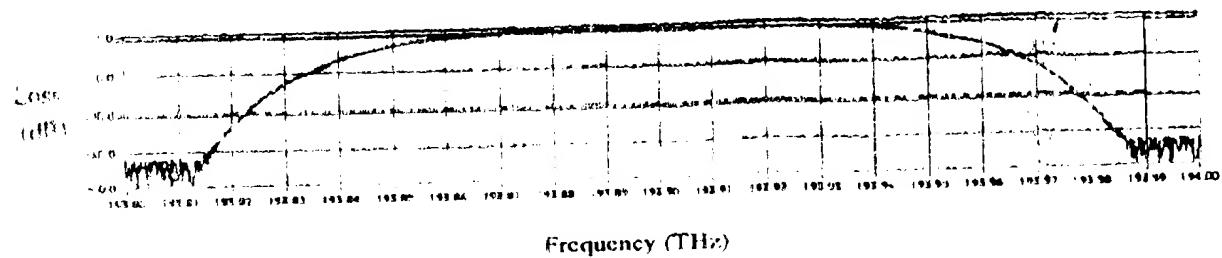


FIG. 9

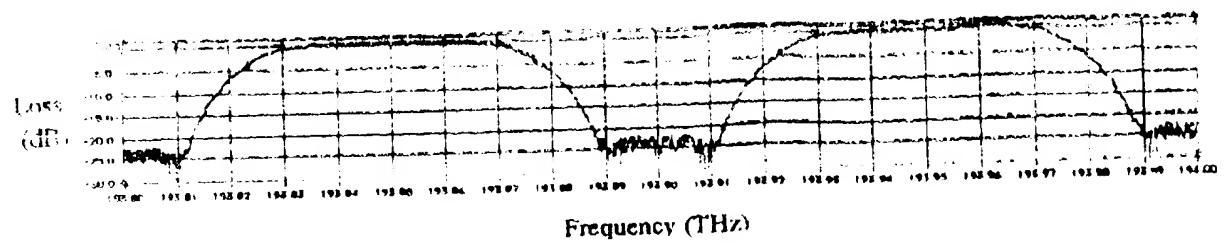
FIG. 10



100 GHz



50 GHz



25 GHz

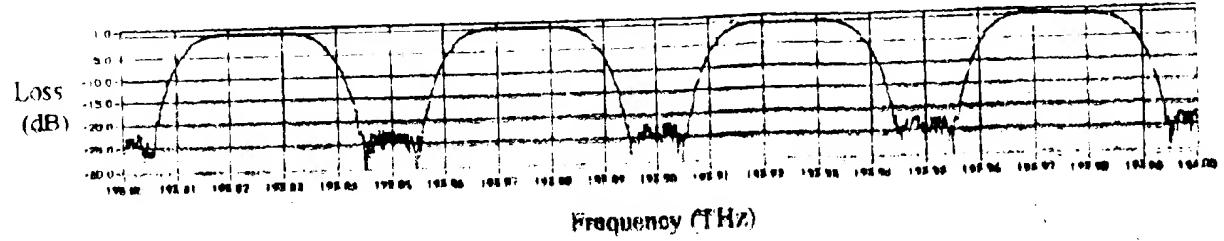


Figure II Comparison of 100, 50, 25 GHz interleaver responses (one output only)

FIG. 12

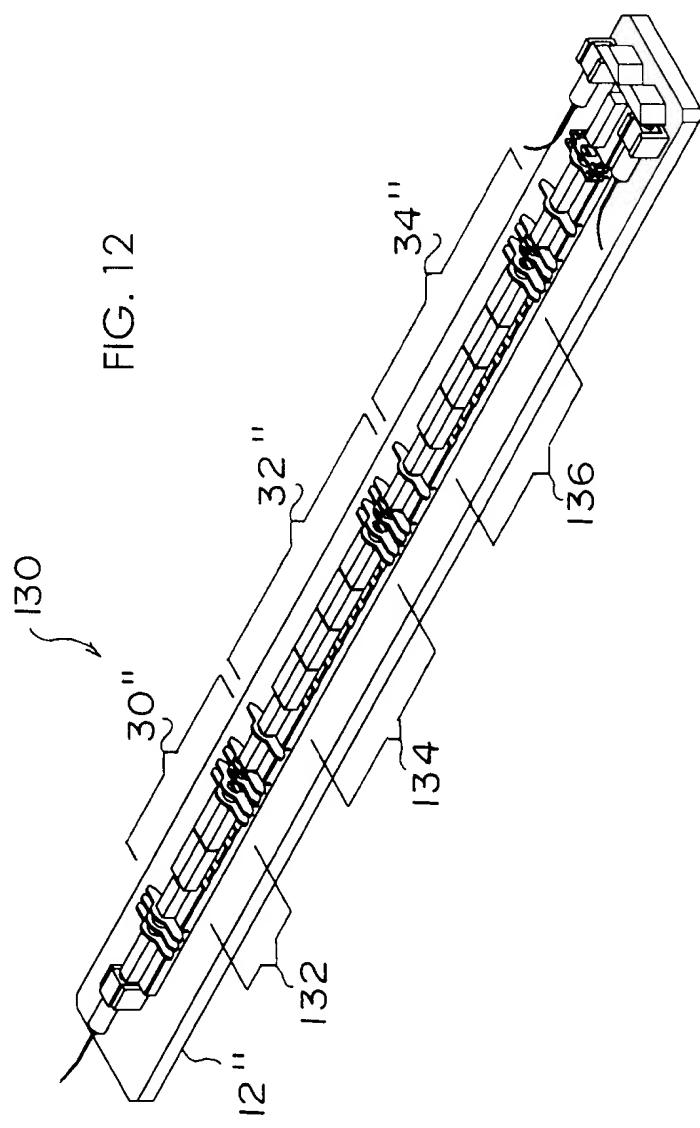


FIG. 13

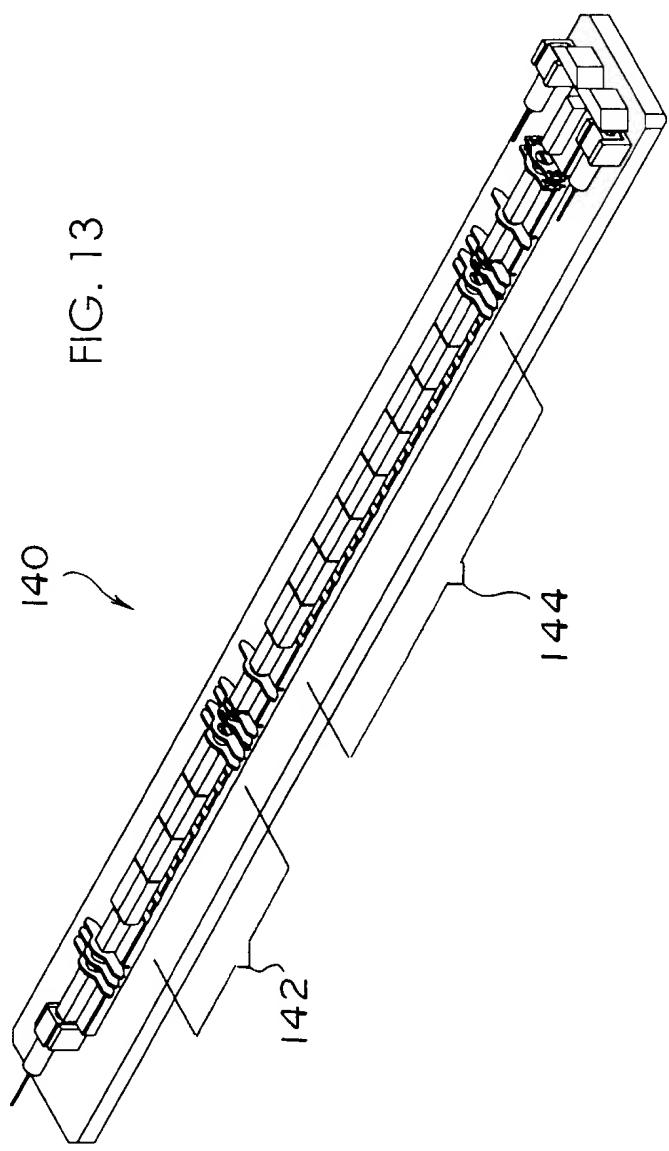


FIG. 14

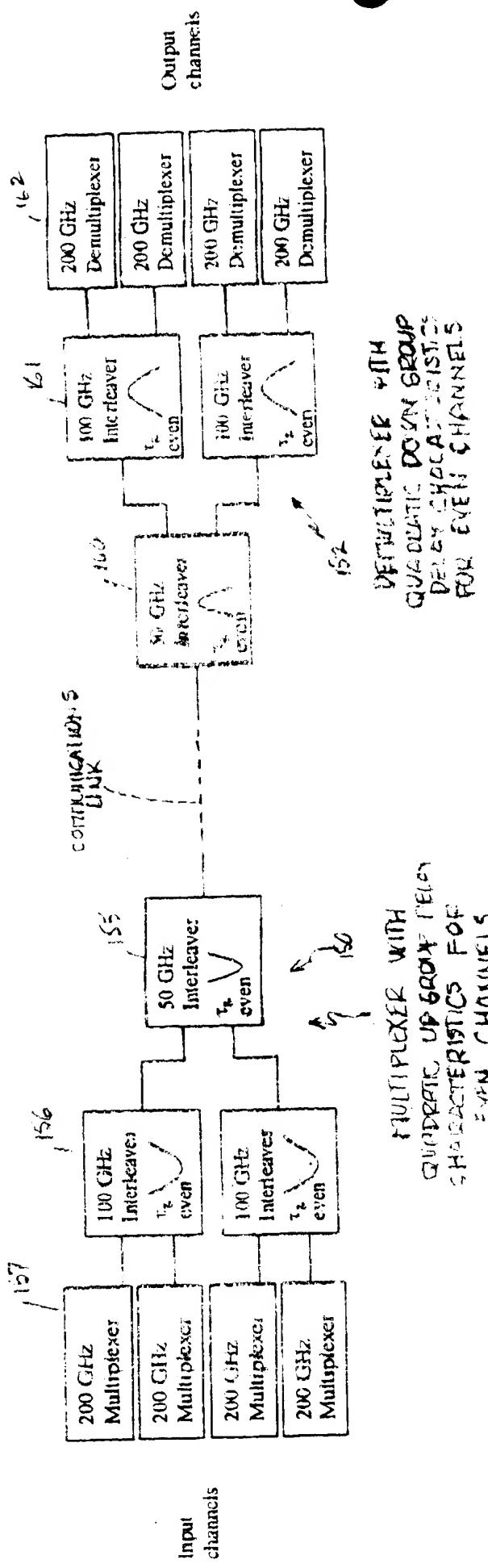
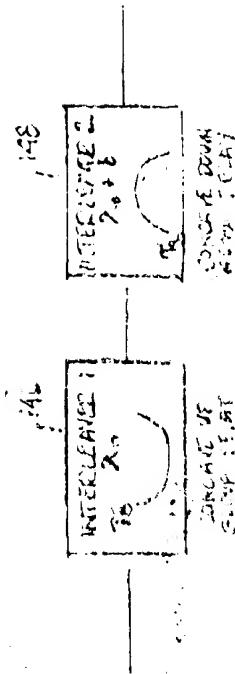


FIG. 15

MULTIPLEXER WITH  
QUADRATIC UP GROUP  
CHARACTERISTICS FOR  
EVEN CHANNELS

DEMULTIPLEXER  
QUADRATIC DOWN GROUP  
DELAY EQUALIZERS  
FOR EVEN CHANNELS

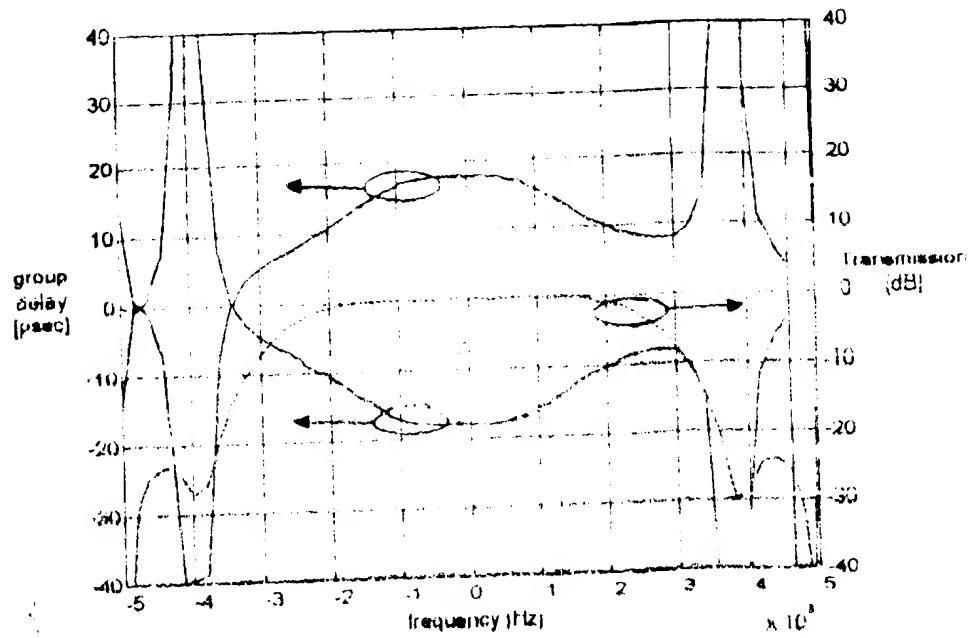


Figure 16 Calculated group delay for even and odd wavelength channels.

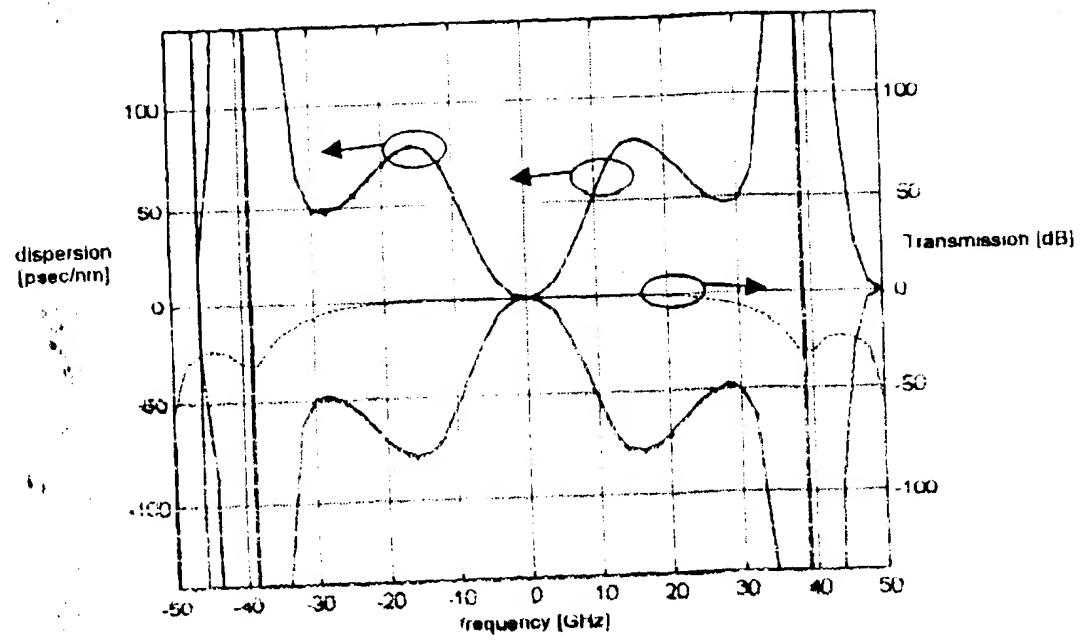
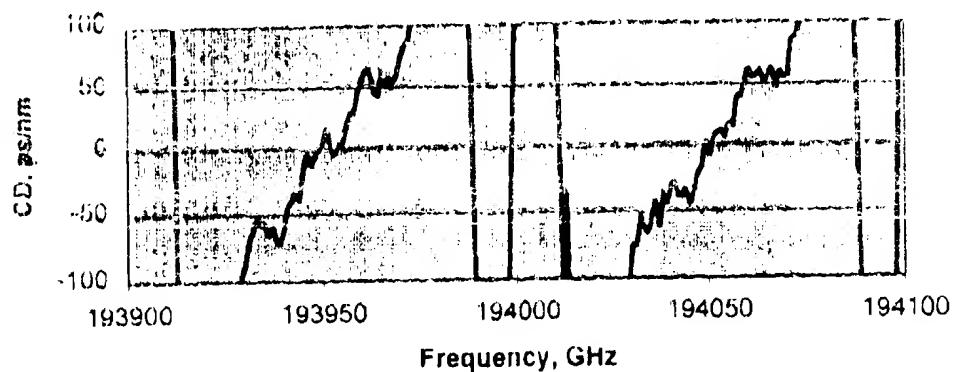


Figure 17 Calculated chromatic dispersion for even and odd wavelength channels.

50 GHz Interleaver Chromatic Dispersion  
Type 1 Channel 2



50 GHz Interleaver Chromatic Dispersion  
Type 1 Channel 1

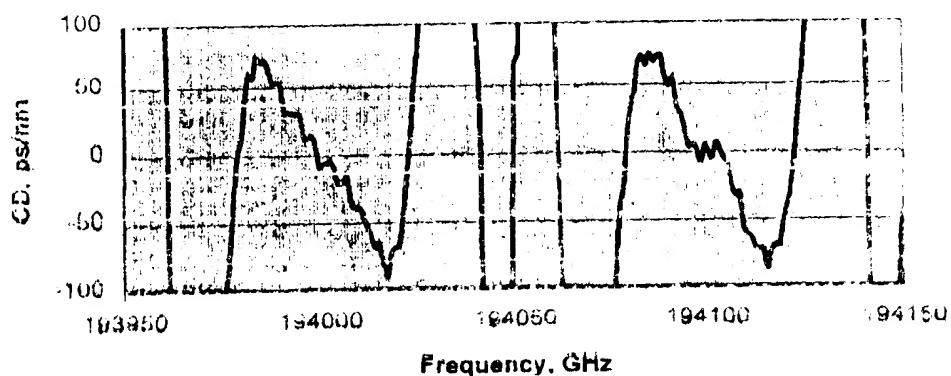
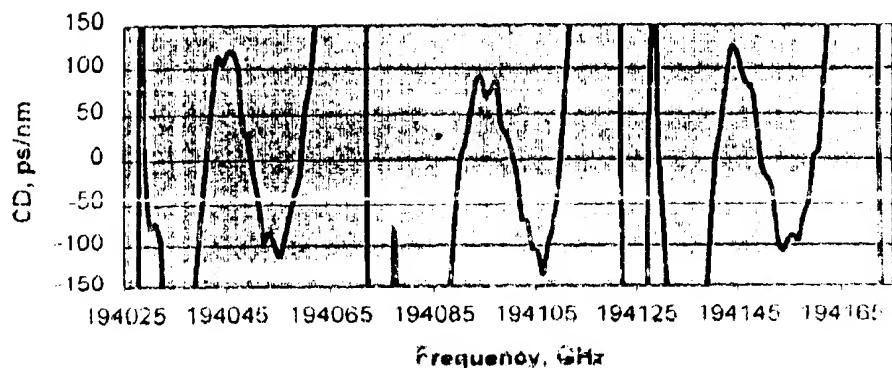
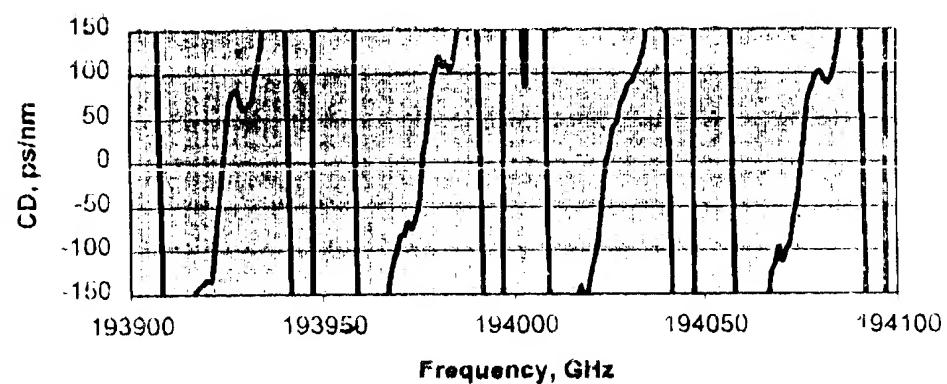


Figure 2<sup>8</sup>: CD of 50 GHz interleaver

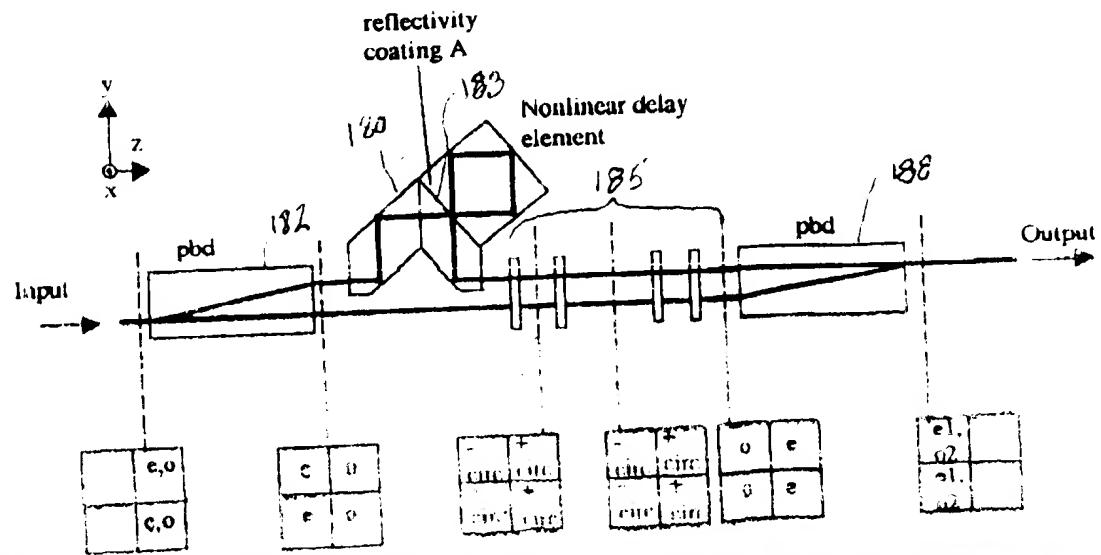
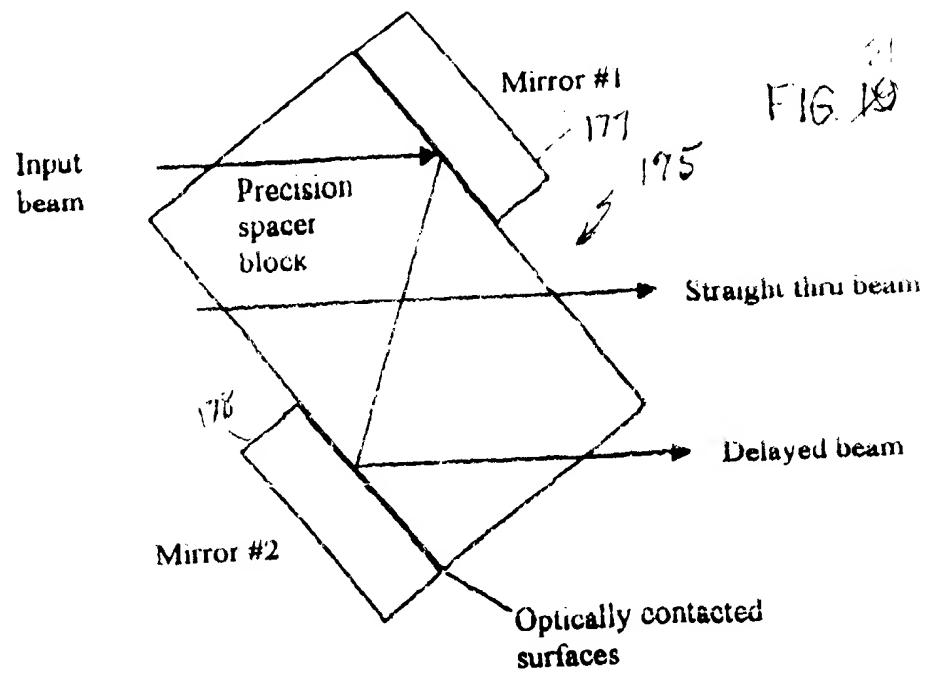
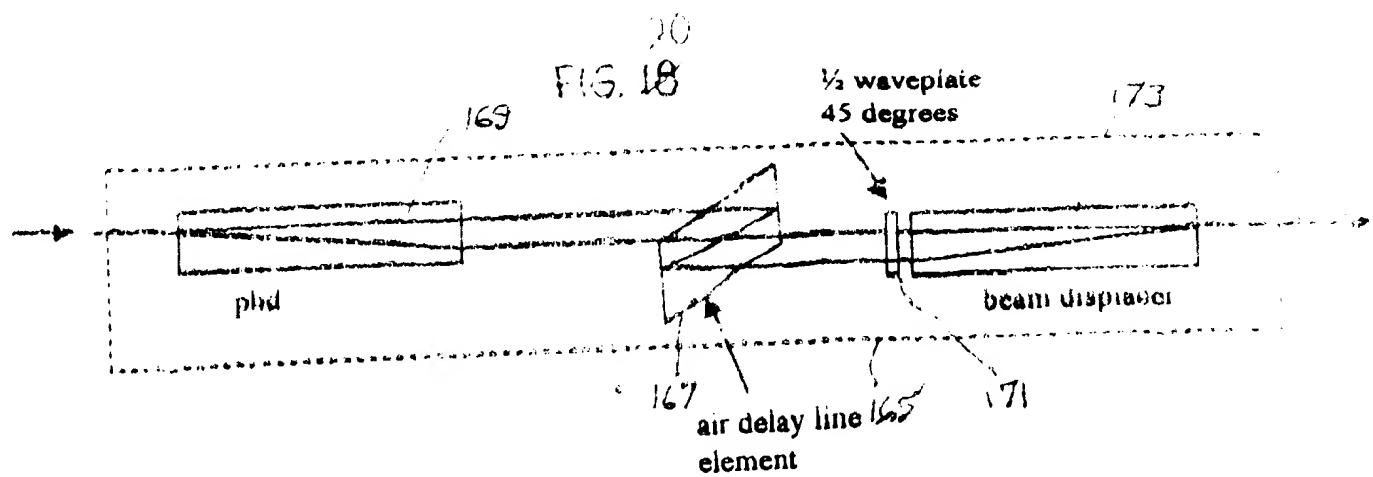
**26 GHz Chromatic Dispersion  
Type 1 Channel 1**



**26 GHz Chromatic Dispersion  
Type 1 Channel 2**



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Figure 24: CD of 25 GHz interleaver



Glass 1 Glass 3

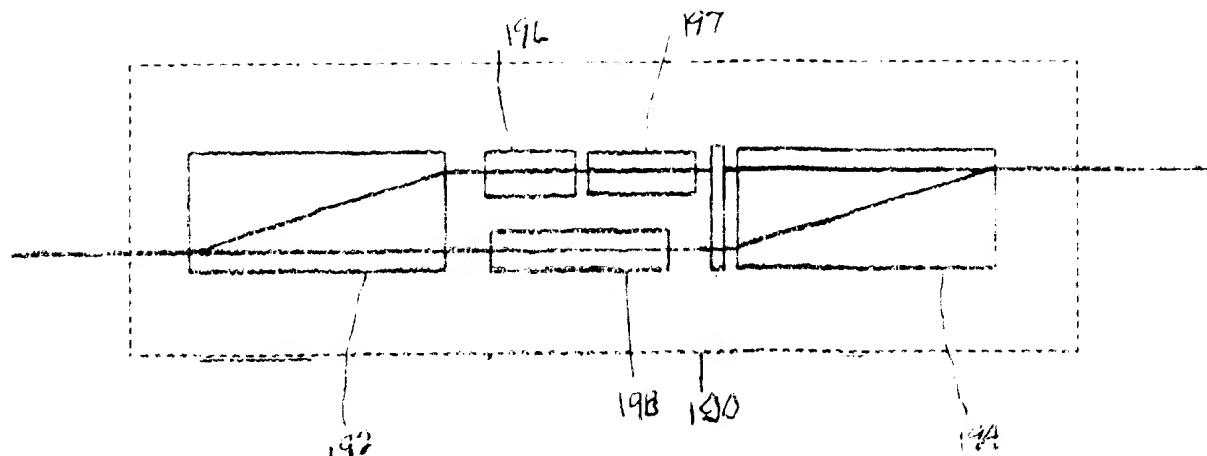


FIG. X 23